

Product datasheet for RC213952

Periplakin (PPL) (NM_002705) Human Tagged ORF Clone

Product data:

Product Type:	Expression Plasmids
Product Name:	Periplakin (PPL) (NM_002705) Human Tagged ORF Clone
Tag:	Myc-DDK
Symbol:	Periplakin
Mammalian Cell Selection:	Neomycin
Vector:	pCMV6-Entry (PS100001)
E. coli Selection:	Kanamycin (25 ug/mL)
ORF Nucleotide Sequence:	>RC213952 representing NM_002705 Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGGCCGGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC
GCCCGATCGCC

ATGAACTCGCTCTTCAGGAAGAGAAACAAAGGCAAATACAGCCCCACTGTGCAGACCCGGAGCATCTCTA
ACAAGGAGCTCTCGGAGCTGATCGAGCAGCTGCAGAAGAATGCCGACCAGGTGGAGAAGAACATCGTGGA
CACAGAGGCCAAGATGCAGAGTGACCTGGCTCGGCTGCAGGAGGGTCGGCAGCCTGAGCACCCGGGACGTG
ACCCTGCAGAAGGTGTTGGACTCTGAGAAGCTGCTCTATGTGCTAGAGGGGATGCGGCCATTGCCAAGC
ACATGAAGCACCCACAGGGGACATGATCGCCGAGGATATCCGCCAGCTGAAGGAGCGTGTGACCAACCT
GCGCGGGAACACAAGCAGATCTACAGGCTGGCGGTGAAGGAAGTGGATCCACAGGTCAACTGGGCGGCA
CTGGTGGAGGAGAAGCTGGACAAGCTGAACAACAGAGCTTTGGGACTGACCTGCCGCTGGTGGACCACC
AAGTGGAGGAGCATAACATCTTCCACAATGAGGTCAAGGCCATCGGGCCCCACCTGGCCAAGGACGGGGA
CAAGGAGCAGAACAGCGAACTCCGGGCCAAGTACCAGAACTGCTGGCAGCATCACAGGCCCGCAGCAG
CACCTGAGTTCGCTGCAGGACTACATGCAGCGCTGCACCAATGAGCTGTACTGGCTGGACCAGCAGGCCA
AGGGCCGATGCAGTACGACTGGAGTGACCGCAACCTCGACTACCCAGCCGCGCGCCAGTATGAGAA
TTTCATCAACCGAACCTGGAGGCCAAAGAGGAGAGAATCAACAACTGCACAGCGAGGGCGACCAGCTG
CTGGCGCGGAGCACCCCGGAGGAACTCCATTGAGGCGCACATGGAGGCTGTGCACGCAGACTGGAAGG
AGTACCTGAACCTGCTCATCTGCGAGGAGACCTCAAGTACATGGAGGACTACCACCAAGTTTACCGA
AGACGTGAAGGACGCTCAGGAGCTGCTGCGCAAGGTGGACTCGGACCTGAACCAGAAGTATGGCCCTGAC
TTCAAGGACCGGTACCAGATTGAGCTGCTGCTGCGGGAGCTGGATGACCAGGAGAAGGTGCTGGACAAGT
ATGAGGACGTGGTGCAGGGGCTGCAGAAGCGAGGCCAGAGTGGTGGCCCTCAAGTACCGCCGGGAGAC
TCCGCTCAAGCCCATCCCGTGGAGGCACTCTGTGACTTTGAGGGGAGCAGGGCCTGATCTCGCGGGG
TACAGCTACACCTGCAGAAGAACAACGGGAGAGCTGGAGCTCATGGACAGCGCTGGGAACAAGCTGA
TTGCTCCGGCCGTCTGTTTTGTGATCCCCCACAGACCTGAGGCCCTGGCTCTGGCTGACAGCCTGGG
CAGCCAGTACCGAGCGTGCAGGAGAGGAGCTGGAGCAACGCACGCTGCAGCAGCGGTATGAGGTG
CTGAAGACCGAGAATCCCGGAGATGCCTCTGACCTACAGGGCGGCGAGCTGCTGGCTGGCTTGGACAAGG
TGCCAGCGACCTGGACCGCAGGAGAAGGCCATCACAGGGATCCTGCGGCCACCACTGGAGCAAGGCC



[View online »](#)

GGCTGTGCAGGACAGTGCCGAGCGGGCCAAGGACCTCAAGAACATCACCAACGAGCTACTGCGGATTGAA
 CCTGAGAAGACGCGGAGCACGGCTGAGGGCGAAGCCTTCATCCAGGCCCTCCAGGCAGTGGCACCACAC
 CCCTGCTGAGGACCCGGGTGGAGGACACCAACCGGAAATACGAGCACCTCCTGCAGCTGCTGGACTTGGC
 CCAGGAGAAGGTTGATGTGGCCAACCGCTGGAGAAGAGCCTGCAGCAGAGCTGGGAGTTGCTGGCCACA
 CACGAGAACCATCTGAATCAGGATGACACAGTGCCTGAGAGCAGCCGTGTCTGGACAGCAAGGGGCAGG
 AGCTGGCGGCCATGGCCTGTGAGTTACAGGCCAGAAGTCCCTCCTGGGTGAGGTGGAGCAGAACTTGCA
 GGGGCCAAGCAGTGTCTGAGCACACTGGCCAGCCGCTTCCAGGAGCACTGCCCGGACCTGGAGCGCCAG
 GAGGCCGAGGTGCACAAGCTGGGCCAGCGTTTCAACAACCTGCGCCAGCAGGTGGAACGACAGGGCCGAGA
 GCCTACAGAGCGCCAAGGCAGCCTACGAGCACTTCCACCGCGGCCATGACCACGTGCTGCAGTTCCTAGT
 CAGCATCCCCAGTTACGAGCCCCAGGAGACAGACAGCCTCAGCCAGATGGAGACCAAGCTGAAGAACCAG
 AAGAACCTGCTAGATGAGATAGCAAGTAGGGAGCAGGAAGTACAGAAGATCTGTGCCAATCCCAGCAGT
 ACCAGCAAGCTGTAAAGGACTATGAGTTAGAAGCAGAAAACTAAGGTCTCTTCTCGACTTGAGAAATGG
 AAGGAGCAGCCACGTGAGCAAGAGAGCCAGGCTCCAATCTCTGCCACAAAGTGAAGGAAGAGGAAGCA
 GCACTTGGCGCAAGTTCAGTGAAGTTTATGCCATCAACAGACAGAGGCTGCAGAATCTGGAGTTTGCTC
 TGATCTCCTCAGACAGCAGCCGGAAGTGAAGTGACCCATGAGACCCTGCAAAGGAATAGGCCGGACTC
 TGGAGTGGAGGAGCGTGGAAAGTACAGGAAGAACTGGATGAGGAGACTGAGCGGAGGCGCAGCTGGAG
 AACGAGGTCAAGAGCACCCAGGAAGAAATCTGGACCTTGAGGAATCAGGGGCTCAGGAATCGGTGGTGA
 GGAAGGAGGTGCTCAAGAAGGTGCCGATCCCCTGCTGGAGGAGAGCTTCCAGCAGCTGCAGCGGACGCT
 GGCAGAGGAGCAGCACAAGAACCAGTGTGCAGGAGGAGCTGGAGGCACTGCAGCTGCAGCTGCGTGCC
 CTGGAGCAGGAGACCAGAGACGGGGGCGAGGAGTACGTGGTCAAGGAGGTCTGCGCATCGAGCCTGACA
 GGGCCCAGGCGGATGAGGTCTTGACAGTGCAGGAGGAGCTGGAGGCACTGAGGCGCAGAAGGGCGCCCG
 GGAGGCAGAGGTGCTCCTCCTGCAGCAGCGTGTGGCCCGCTGGTGAAGAGAAGAGCCGGCGCAGGAG
 AAGTGCACAGAGAAAGAGGTGGTAAACTGCAGAATGACCCAGCTGGAGGCAGATACCAGCAGTGC
 AGGAGGACCACCAGCGCCAGGACCACTCAGGGAGAAGCAGGAGGAGGAGCTGAGCTTCTCCAGGACAA
 GCTCAAGAGGCTAGAGAAGGAGCGGCCATGGCCGAGGGCAAGATCACCGTCAAGGAGGTGCTCAAGGTG
 GAGAAGGACGCGGCCACCGAGAGGGAGGTGAGCGATCTCACCGCCAATATGAGGACGAGGCTGCCAAGG
 CTCGCGTAGCCAGAGGGAGAAGACGGAGCTGCTCCGAAAGATATGGGCCTTGGAGGAGGAGAACGCCAA
 AGTGGTGGTGCAGGAGAAGGTGCGGGAGATCGTGCGGCCAGCCCAAGGCGAAAGTGAAGTGGCGAAC
 CTCGCGCTGGAGCTTGTGGAGCAGGAGCGAAAGTACCGGGGTGCCGAGGAGCAGCTCCGGAGCTACCAGA
 GTGAGCTGGAGGCCCTCAGGAGGCGAGGCCCCAGGTGGAAGTCAAAGAGGTGACTAAGGAAGTCATTAA
 GTACAAGACTGACCCTGAGATGGAGAAGGAGCTTACGCGGCTCAGGGAGGAGATCGTGGACAAGACCAGA
 CTGATCGAAAGGTGTGATTTAGAGATCTACCAGCTGAAAAAGGAAATCCAGGCCCTGAAAGACACCAAAC
 CCCAGGTCCAGACCAAAGAGGTGGTCCAGGAGATCCTCCAATTCCAAGAAGACCCCTCAAACCAAGGAGGA
 GGTGGCGTCTCTGAGGGCAAAGCTCTCAGAGGAGCAGAAGAAACAAGTGGATCTGGAGAGGGAAAGAGCT
 TCCCAGGAAGAGCAGATCGCCCGAAAGAGGAGGAGCTCTCGCGGTGAAGGAAAGGGTGGTGCAGCAGG
 AGGTGGTCAGGTATGAGGAGGAGCCAGGCTGCGGGCCGAGGCGAGCGCCTTGGCCGAGAGCATCGATGT
 GGAGCTGCGGCAGATTGACAAGCTGCGGGCAGAGCTGCGCGGCTGCAGCGCCGGCGCACCGAGCTTGAG
 CGGCAGCTGGAGGAGCTAGAGCGCAGCGGCAGGCCCGCAGGGAGGCCGAGCGGAGGTACAGCGGTTGC
 AGCAGCGGCTGGCAGCGCTGGAGCAGGAAGAAGCTGAGGCCCTGAGAAGGTAACCCATACGCAGAAGGT
 GGTGCTGCAGCAGGACCCGAGCAGCGCGAGAGCATGCCCTGCTCCGACTCCAGCTGGAAGAAGAGCAG
 CACCGGGCGCAGCTCCTGGAGGGGAGCTCGAGACCCTCCGAGGAAACTGGCTGCACTGGAGAAGCGG
 AGGTCAAGGAGAAGTGGTGTCTCTCGAGAGTGTCCAGGTGGAGAAGGGCGACACCGAGCAAGAGATCCA
 GAGGCTCAAGAGCAGCCTGGAGGAGGAGCCGACAGCAAGCGGAGCTGGACGTGAGGTTGAGCCGGCTG
 GAAGCCAGGCTTTCGGAGCTGGAATCCATAACTCCAAGTATCCAAGGAACTAGACTTTCTGAGGGAAG
 AGAACCACAAATTACAGCTGGAGAGGCAAAACCTGCAGCTGGAGACCCGAAGGCTCCAATCGAAATCAA
 CATGGCAGCGACGAAACACGAGACCTGCGGAACATGACCGTGGCGGACTCTGGACCAACCATGACTCC
 AGACTGTGGTCCCTGGAGAGGAACTGGATGACCTCAAGAGGCTCTCAAGGACAAGACCTCGAGATCG
 ACGAGCTGCAGAAGCGCCTGGGCTCCGTGGCCGTCAAGCGGGAGCAGCGGAGAACCACCTGCGGGGCTC
 CATCGTAGTCATCCACCCTGACACAGGCCGCGAGCTGTCCCCGGAGGAAGCCACCGTGCAGGGGCTCATT
 GACTGGAACATGTTCTGTGAAACTCAGAAGCCAGGAGTGCAGCTGGGAGGAGATCTCAGTGAAGGGTCCCA
 ATGGGGAGTCTCAGTGATACACGACAGGAAGTCTGGCAAGAAGTTCTCCATCGAAGAGGCCCTGCAGAG
 TGGCAGGTGACCCTGCTCAGTATGACCGCTATGTCAACAAGGATATGTCCATCCAGGAGCTGGCGGTC

TTGGTATCTGGGCAGAAG

ACGCGTACGCGGCCGCTCGAGCAGAACTCATCTCAGAAGAGGATCTGGCAGCAATGATATCCTGGATT
ACAAGGATGACGACGATAAGGTTTAA

Protein Sequence:

>RC213952 representing NM_002705
Red=Cloning site Green=Tags(s)

MNSLFRKRNGKYSPTVQTRSISNKESELIEQLQKNADQVEKNIVDTEAKMQSDLARLQEGRQPEHRDV
TLQKVLDESEKLLYVLEADAAIAKHMHPQGDMAIEDIRQLKERVNLRGKHKQIYRLAVKEVDPQVNWAA
LVEEKLDKLNQSFQGTDLPLVDHQVEEHNI FHNVEVKAIGPHLAKDGDKEQNSLRACYQKLLAASQARQQ
HLSSLQDYMQRCTNELYWL DQQA KGRMQYDWSDRNLDYPSRRRQYENFINRNLEAKEERINKLHSEGDQL
LAAEHPGRNSIEAHMEAVHADWKEYLNLLICEESHLYMEDYHQFHEDVKDAQELLRKVSDLNQKYGPD
FKDRYQIELELLRELDDQEKVLDKYEDVVQGLQKRGQVVPLKYRRETPLKPIPVEALCDFEGEQGLISRG
YSYTLQKNNGESWELMDSAGNKL IAPAVCFVIPPTDPEALALADSLGSQYRSVRQKAAGSKRTLQQRVEY
LKTENPGDASDLQGRQLLAGLDKVASDLDRQEKAITGILRPPELQGRAVQDSAERAKDLKNITNELLRIE
PEKTRSTAEGEAFIQALPGSGTTPLLRTRVEDTNRKYEHLLQLLDLAQEKVDVANRLEKSLQSWELLAT
HENHLNQQDTPVPESSRVLDSKGQELAAMACELQAQKSLLEGEVQNLQAAKQCSSTLASRFQEHCPDLERQ
EAEVHKLQGRFNNLRQQVERRASLSAKAAAEHFHRGHHDVLFVLSIPSYEPQETDLSQMETKLNQ
KNLLDEIASREQEVQKICANSQQYQAVKDYELAEKLRSLLDLENGRSSHVSKRARLQSPATKVEEEA
ALAAKFTEVYAINRQLQNL E FALNLLRQQPEVEVTHE TLQRNRPDSGVVEAWKIRKELDEETERRRQLE
NEVKSTQEEIWTLRNQGPEQSVVRKEVLKVPDPVLEESFQQLQRTL AEEQHKNQLLQEELEALQLQLRA
LEQETRDGGQEYVVKVLELRIEPDRAQADEVLQLREELEALRRQKGAREAEVLLLQQRVAALAEKSRQAE
KVTEKEVVKLQNDPQLEAEYQQLQEDHQDQDLREKQEEEL SFLQDKLKRLEKERAMAEGKITVKEVLKV
EKDAATEREVSDDLTRQYEDAAKARASQREKTELLRKIWALEENAKVVVQEKVREIVRDPKAESEVAN
LRLELVEQERKYRGAEEQLRSYQSELEALRRRGPQVEVKEVTKEVIKYKTDPEMEKELQRLREIIVDKTR
LIERCDLEIYQLKKEIQALKDTPQVQTKVVEVQIILQFQEDPQTKEEVASLRAKLSEEQKQVDLERERA
SQEEQIARKEEELSRVKERVVQEVVRYEEEPGLRAEASAFSAESIDVELRQIDKLRAELRRLQRRRTELE
RQLEELERERQARREAEVQRLQQLAALAEQEEAEAREKVTHQKVVLLQDPPQAREHALLRLQLEEEQ
HRRQLLEGELETLRRKLAALAEKAEVKEKVVLSSESVQVEKGDTEQEIQLKSSLEEEESRSKRELDVEVSRL
EARLSELEFHNSKSSKELDFLREENHKLQLERQNLQLETRRLQSEINMAATETRDRLRNMTVADSGTNHDS
RLWSLERELDDLKRLSKDKDLEIDELQKRLGSVAVKREQRENHLRRSIVVIHPDGTGRELSPEEAHRAGLI
DWNMFVKLRSQECDWEEISVKGPNGESSVIHDRKSGKKFSIEEALQSGRLTPAQYDRYVVKDMSIQELAV
LVSGQK

TRTRPLEQKLI SEEDLAANDILDYKDDDDKV

Chromatograms:

https://cdn.origene.com/chromatograms/mk8029_b04.zip

Restriction Sites:

SgfI-MluI

Cloning Scheme:



ACCN: NM_002705

ORF Size: 5268 bp

OTI Disclaimer: The molecular sequence of this clone aligns with the gene accession number as a point of reference only. However, individual transcript sequences of the same gene can differ through naturally occurring variations (e.g. polymorphisms), each with its own valid existence. This clone is substantially in agreement with the reference, but a complete review of all prevailing variants is recommended prior to use. [More info](#)

OTI Annotation: This clone was engineered to express the complete ORF with an expression tag. Expression varies depending on the nature of the gene.

Components: The ORF clone is ion-exchange column purified and shipped in a 2D barcoded Matrix tube containing 10ug of transfection-ready, dried plasmid DNA (reconstitute with 100 ul of water).

Reconstitution Method:

1. Centrifuge at 5,000xg for 5min.
2. Carefully open the tube and add 100ul of sterile water to dissolve the DNA.
3. Close the tube and incubate for 10 minutes at room temperature.
4. Briefly vortex the tube and then do a quick spin (less than 5000xg) to concentrate the liquid at the bottom.
5. Store the suspended plasmid at -20°C. The DNA is stable for at least one year from date of shipping when stored at -20°C.

RefSeq: [NM_002705.3](#), [NP_002696.3](#)

RefSeq Size: 6256 bp

RefSeq ORF: 5271 bp

Locus ID: 5493

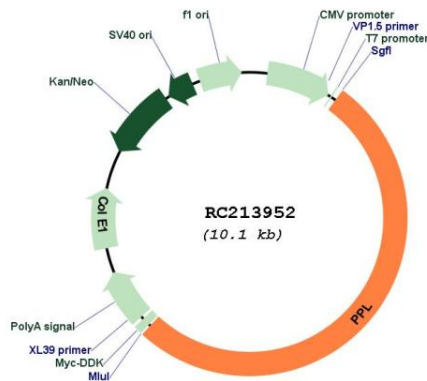
UniProt ID: [O60437](#)

Cytogenetics: 16p13.3

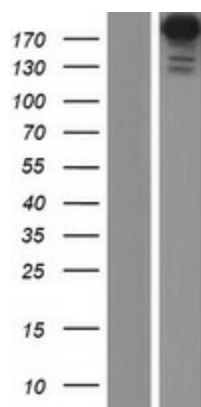
MW: 204.5 kDa

Gene Summary: The protein encoded by this gene is a component of desmosomes and of the epidermal cornified envelope in keratinocytes. The N-terminal domain of this protein interacts with the plasma membrane and its C-terminus interacts with intermediate filaments. Through its rod domain, this protein forms complexes with envoplakin. This protein may serve as a link between the cornified envelope and desmosomes as well as intermediate filaments. AKT1/PKB, a protein kinase mediating a variety of cell growth and survival signaling processes, is reported to interact with this protein, suggesting a possible role for this protein as a localization signal in AKT1-mediated signaling. [provided by RefSeq, Jul 2008]

Product images:



Circular map for RC213952



Western blot validation of overexpression lysate (Cat# [LY419155]) using anti-DDK antibody (Cat# [TA50011-100]). Left: Cell lysates from untransfected HEK293T cells; Right: Cell lysates from HEK293T cells transfected with RC213952 using transfection reagent MegaTran 2.0 (Cat# [TT210002]).